Letter RO-4 – Center for Biological Diversity, California Chaparral Institute, and Preserve Wild Santee

RO-4-1 The comment provides introductory statements for the comment letter. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-2 The commenter states that "the County's environmental review of the Project is deficient and fails to adequately analyze or mitigate for the Project's significant environmental impacts." The commenter provides no specific examples; therefore, it is not possible to provide further response.

RO-4-3 The comment provides introductory statements and background information about the commenter, the Center for Biological Diversity. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-4 The comment provides introductory statements and background information about the commenter, Preserve Wild Santee. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-5 The comment provides introductory statements and background information about the commenter, The California Chaparral Institute. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-6 The commenter states that "…the RDEIR for the project fails to comply with CEQA and the CEQA Guidelines in numerous respects." The commenter does not provide any specific examples; therefore, no further response is provided.

RO-4-7 The comment states the EIR's analysis of and mitigation for the proposed Project's greenhouse gas emissions is inadequate. The comment serves as an introduction to comments that follow and sets forth the commenter's conclusion that Section 2.10, Global Climate Change, of the 2019 Recirculation Package fails to adequately analyze and mitigate the proposed Project's greenhouse gas emissions. Please see Responses to Comments RO-4-8 through RO-4-35 for responses to specific comments regarding greenhouse gas emissions.

RO-4-8 The comment summarizes research of the Intergovernmental Panel on Climate Change (IPCC), as well as findings presented in the United States' 2014 Third National Climate Assessment and 2017 Climate Science Special Report. The research and findings pertain to background information regarding the influence of human-caused activities on global climate change, and the environmental consequences of global climate change. The comment does not identify any issue with the information and analysis presented in Section 2.10, Global Climate Change, of the 2019 Recirculation Package; therefore, no further response is required.

RO-4-9 The comment summarizes research of the U.S. National Research Council, U.S. Environmental Protection Agency (USEPA), and other climate change scientists, as well as findings presented in the United States' 2014 Third National Climate Assessment. As with Comment RO-4-8, the research and findings pertain to background information regarding the influence of human-

caused activities on global climate change, and the environmental consequences of global climate change. The comment does not identify any issue with the information and analysis presented in Section 2.10, Global Climate Change, of the 2019 Recirculation Package; therefore, no further response is required.

RO-4-10 The comment states that "immediate and aggressive [GHG] emissions reductions are necessary to keep warming well below 2C above pre-industrial levels." The commenter also cites information provided in the IPCC's Fifth Assessment Report regarding global carbon budgets, as well as information regarding estimated increments of global warming (as measured in degrees Celsius). The comment does not identify any issue with the information and analysis presented in Section 2.10, Global Climate Change, of the 2019 Recirculation Package; therefore, no further response is required.

RO-4-11 The comment summarizes research from the World Resources Institute regarding the United States' position as "the world's biggest cumulative emitter of GHGs… and the world's second highest emitter on an annual and per capita basis." The comment then states that U.S. climate policy is "wholly inadequate" for purposes of avoiding the "worst dangers of climate change." The comment does not identify any issue with the information and analysis presented in Section 2.10, Global Climate Change, of the 2019 Recirculation Package; therefore, no further response is required.

RO-4-12 The comment states that California's climate change legislation, regulation, and policy are "[i]n response to inadequate action on the national level." The comment specifically references Assembly Bill (AB) 32, Executive Orders B-30-15 and B-55-18, and Senate Bill (SB) 375. The comment does not identify any issue with the information and analysis presented in Section 2.10, Global Climate Change, of the 2019 Recirculation Package (which discusses each of the referenced pieces of legislation and executive orders); therefore, no further response is required.

RO-4-13 The comment states that "climate change is a problem with cumulative impacts and effects," such that it is the "combined impacts of many [emissions] sources [that] can drastically damage California's climate as a whole." As such, the comment supports "project-specific GHG emissions disclosure, analysis and mitigation." The comment does not identify any issue with the information and analysis presented in Section 2.10, Global Climate Change, of the 2019 Recirculation Package (which discloses proposed Project-related emissions, impacts, and mitigation); therefore, no further response is required.

RO-4-14 The comment states that by relying on offsets to allow the proposed Project applicant to "to buy its way out" of having to actually reduce the GHG emissions of the proposed Project, the EIR fails to adopt feasible mitigation measures that could reduce the proposed Project's GHG emissions. For information responsive to this comment, please see Global Response R1: Carbon Offsets. Also please refer to Section 2.10, Global Climate Change, of the 2019 Recirculation Package, which explains the onsite project design features that reduce GHG emissions and why the use of carbon offsets is also a feasible and effective way to reduce GHG emissions under CEQA. The comment does not identify or recommend any specific construction or operational strategies to reduce the GHG emissions of the proposed Project. Therefore, no further response is provided.

RO-4-15 The comment states "The EIR's utter failure to require feasible mitigation measures to reduce GHG emissions from the Project" is made evident by a comparison with the Otay Village 14 Project. The commenter also provides two tables with comparative calculations of the Village 13 and Village 14 Projects. However, a direct comparison cannot be made between the two projects because they are located on two different sites with two different land use mixes. For example, the Village 14 Project includes 1,119 residential units, whereas the Village 13 Project includes 1,938 residential units, an increase of more than 40 percent that directly results in an escalation of Village 13 emissions as compared to Village 14 emissions.

The commenter's comparative calculations are based on an underestimated population projection for the Village 13 Project. As discussed in Section 3.5, Population and Housing, of the 2015 Draft EIR, the proposed Village 13 Project would accommodate an estimated residential population of 6,957 (not 5,384) persons, based on SANDAG data. The commenter also incorrectly identifies the residential population total for the Village 14 Project. As discussed in Section 3.1.5, Population and Housing, of the certified Final EIR for the Village 14 Project, that Project would accommodate an estimated residential population of 3,941 (not 5,269) residents. The certified Village 14 EIR (State Clearinghouse #2016121042) is available on the County's website. Thus, the projected residential population for the Village 13 Project is 43 percent greater than the Village 14 Project. Several factors, such as the land use development parameters (e.g., the Village 13 Project proposes 1,938 residential units, whereas the Village 14 Project includes 1,119 residential units), buildout schedule, size of development footprint, and grading quantities, illustrate important bases for the distinction between the GHG emissions inventory data for the Village 13 and Village 14 Projects.

RO-4-16 The comment states the EIR offers no reason why total and per capita emissions are much higher for the Village 13 Project in comparison to the Village 14 Project. Please see Response to Comment RO-4-15 for an explanation of Village 13 Project GHG emissions and the additional factors beyond population used to estimate a project's GHG emissions. As discussed therein, the comment focuses on the unmitigated emissions values, rather than the similarities between the two projects' emission reduction frameworks, as established via a suite of project design features/environmental design considerations and mitigation measures.

RO-4-17 The comment restates information presented in Section 2.10, Global Climate Change, of the 2019 Recirculation Package regarding the California Air Resources Board's (CARB) recommendation that lead agencies prioritize on-site design features to reduce emissions. The County notes that the proposed Project's suite of environmental design considerations and mitigation measures is consistent with CARB's recommendation, as the proposed Project's on-site emissions reduction framework addresses the primary aspects of the proposed Project's emissions source profile (e.g., building energy consumption; vehicle miles traveled). The comment does not raise an issue pertaining to the adequacy of the environmental analysis; therefore, no further response is required.

RO-4-18 The comment states that "[t]he EIR's failure to include mitigation to reduce the Project's emissions from vehicle miles traveled ('VMT') is particularly troubling." The comment then states the EIR proposes to reduce emissions from vehicles by a reduction of only 5% through

implementation of mitigation measure M-GCC-1. In response, mitigation measure M-GCC-1 sets forth Transportation Demand Management (TDM) strategies for residents, students, resort guests, and employees that collectively serve to reduce VMT. The TDM strategies were developed for the proposed Project by Chen Ryan Associates, following review of the proposed Project attributes and location and with reference to CAPCOA's TDM-related recommendations and quantification methodologies.

The proposed Project's approach to reducing VMT is multi-faceted: (1) the proposed Project is part of the master-planned Otay Ranch community, and benefits from the mix of uses provided throughout that community; (2) the proposed Project includes on-site, resident-serving uses within its own tract map boundary that serve to reduce trip lengths; and (3) mitigation measure M-GCC-1 contains TDM strategies for the reduction of VMT that are appropriate for the proposed Project's mix of uses and location. As discussed in the analysis prepared by Chen Ryan Associates (see Appendix A to Appendix C-2 of the 2019 Recirculation Package~~ecirculated Portions of the Draft EIR~~), not all TDM strategies that will be implemented by the proposed Project are readily quantifiable. For example, the VMT quantification estimate does not take credit for the implementation of (i) a Walking School Bus Program for the on-site school, or (ii) a bike-sharing program at the on-site resort. While not immediately quantifiable, it is expected that implementation of these TDM strategies will result in additional VMT reductions conservatively not reported in the EIR.

It also is noted that the GHG emissions analysis presented in Section 2.10 of the 2019 Recirculation Package conservatively does not take quantitative credit for implementation of mitigation measure M-GCC-6, which will increase access to zero emission vehicle charging infrastructure in the Project site's residential and non-residential development areas beyond the existing regulatory standards. While not a VMT reduction strategy, implementation of mitigation measure M-GCC-6 also would serve to reduce the quantity of GHG emissions from mobile sources.

RO-4-19 The comment states that mitigation measure M-GCC-1 consists of "aspirational, unenforceable, vague, and deferred actions." In response, the TDM strategies presented in M-GCC-1 were formulated based on a supporting technical memorandum prepared by a transportation expert, Chen Ryan Associates (see Appendix A of Appendix C-2 in the 2019 Recirculation Package). Notably, Chen Ryan's analysis (specifically Table 1 therein) presents the quantification of expected VMT reductions from each TDM strategy based on technical guidance presented in CAPCOA's *Quantifying Greenhouse Gas Mitigation Measures* report. Please also see Response to Comment RO-3-8, which contains information regarding the traffic calming features required by M-GCC-1, as well as the dissemination of information regarding transit options to residents.

RO-4-20 The comment states there are numerous feasible transportation-related measures that could considerably reduce VMT. The comment then refers to CAPCOA's *Quantifying Greenhouse Gas Mitigation Measures* report as a source of "transportation-focused measures that the EIR should analyze, including, for example, providing local shuttles and installing Park-and-Ride lots." In response, as noted in Response to Comment RO-4-19, Chen Ryan Associates utilized the referenced CAPCOA report when preparing its analysis included in Appendix A of Appendix C-

2 in the 2019 Recirculation Package and incorporated appropriate TDM strategies into its analysis. As to the provision of local shuttles and installation of a park-and-ride lot, these were determined infeasible or not effective as explained below.

As shown in Appendix A in through C-2 of the 2019 Recirculation Package (which contains the analysis prepared by Chen Ryan Associates 2019), implementing the feasible transportation mitigation measures identified in M-GCC-1 would reduce the overall proposed Project VMT by 4.97% or 8,056 daily VMT. Other mitigation measures that were suggested in the CAPCOA report were evaluated and determined infeasible or ineffective at this time.

In regard to the local (internal) shuttle service, the proposed Project is designed to be a compact, walkable and bikeable community. Thus; thus, a local shuttle service between the residential area of the proposed Project and the town center area is not needed.

Additionally, park-and-ride lots are designed and managed by the State of California Department of Transportation (Caltrans). According to Caltrans' Park and Ride Program Resource Guide (2010), "Significant considerations are location [sic] in respect to a State highway, the choice of lead agency, linkage to other transportation modes, and connection to transit oriented developments" (p. 3). As such, the majority of the existing park-and-ride lots in the San Diego region are located near a state highway to make it convenient for commuters to meet and utilize either transit or carpool. A park-and-ride lot located centrally within the Project site would not be feasible or effective as Village 13 is not adjacent to a State highway. Of note, an existing park-and-ride lot is located at the East Palomar Street Transit Station, which provides a safe and convenient to carpool, vanpool, and transit users alike. This Transit Station and its park-and-ride lot are approximately 8 miles west of the Project site and could be used by proposed Project residents commuting to their places of employment.

RO-4-21 The comment concludes that the proposed Project's EIR has failed to adopt all feasible mitigation measures to reduce its GHG emissions. However, Section 2.10, Global Climate Change, of the 2019 Recirculation Package sets forth a mitigation framework that reduces Project-related GHG emissions to net zero, thereby avoiding any adverse change to existing environmental conditions. Please also see Global Response R1: Carbon Offsets, which explains why the use of carbon offsets (in combination with the proposed Project's other on-site emissions-reducing strategies) is a feasible and effective way to reduce GHG emissions under CEQA.

RO-4-22 The comment states that the EIR's reliance on offset purchases to mitigate the vast majority of the proposed Project's GHG emissions is flawed. The comment serves as an introduction to the commenter's "significant concerns" regarding the use of carbon offsets to mitigate the proposed Project's GHG emissions. Please see Response to Comment RO-4-23 through Response to Comment RO-4-27 for information responsive to specific comments on this subject. The County also notes that CARB, in its *California's 2017 Climate Change Scoping Plan*, provided that—when evaluating project-level mitigation options for the reduction of GHG emissions–"[i]t may also be appropriate to utilize credits issued by a recognized and reputable voluntary carbon registry."

RO-4-23 The comment characterizes the use of carbon offsets as a "mitigation fee," summarizes CEQA case law pertaining to the adequacy of mitigation fee programs, and states that the EIR's use of carbon offsets is insufficient because it "fails to provide evidence that qualifying offsets will include only those that function in a manner that will result in actual, effective mitigation, and defers the decision regarding what instruments qualify to a third-party accrediting organization." In response, mitigation measures M-GCC-7 and M-GCC-8 provide multiple criteria and performance standards designed to ensure that carbon offsets procured for the proposed Project, should it be approved, would be of high environmental integrity and secured from carbon registries that have been approved by CARB. These two mitigation measures ensure that carbon offsets are purchased from recognized, reputable carbon registries, and that the offsets meet enumerated standards designed to ensure the offsets are generated by projects and activities that effectively avoid, reduce or sequester GHG emissions. The use of carbon offsets in this context also is not analogous to a "mitigation fee," as characterized by the commenter, because the offsets purchased by the Project applicant would relate to a specific activity(ies) undertaken to reduce GHG emissions pursuant to scientifically-vetted protocols. Please also see Global Response R1: Carbon Offsets, which explains why the use of carbon offsets is a feasible and effective way to reduce GHG emissions under CEQA.

RO-4-24 The comment states that "the EIR fails to provide evidence that a sufficient quantity of offset credits is available" and will continue to be available and claims that the mitigation measures include "no fallback provisions" in the event that a sufficient quantity of offsets is not available. The County acknowledges that development of offset projects is driven by market demand, which—at least in part—is influenced by California's strong environmental protection policies. Further, the proposed Project's mitigation triggers protect against the speculative potentiality referenced by the commenter, as proof that a sufficient offset quantity must be provided *before* issuance of permits. Therefore, if offsets are not available, permits will not be issued and emissions will not occur. Please also see Global Response R1: Carbon Offsets for evidence regarding the quantities of offsets issued by carbon registries.

RO-4-25 The comment states that "the EIR does not ensure that offsets purchased to mitigate the Project's impacts will come from local, regional, or state GHG reduction projects." The comment also states the EIR grants the County Planning Ddirector broad discretion to allow the Project applicant to acquire credits on the national or international market. The comment further states "offsets on the international market can have dubious effectiveness and weak enforcement mechanisms, and as a result can be cheaper and more attractive to buyers." In response, both mitigation measures M-GCC-7 and M-GCC-8 include a process by which the Director of the Planning & Development Services Department shall assess whether the proposed Project's offsets have been procured in accordance with the geographic prioritization preference, which requires local reduction options prior to the use of reduction options affiliated with more distant geographies. This process, as described in each mitigation measure's "Locational Performance Standards" and "Reporting and Enforcement Standards," requires the preparation and submittal of market survey reports by a carbon offset broker with enumerated content requirements. As updated in the Final EIR, neither mitigation measure M-GCC-7 nor mitigation measure M-GCC-8 permit the use of international offsets.

RO-4-26 The comment states that mitigation measure M-GCC-8 provides a "one-way ratchet" to reduce the GHG emissions mitigation burden, but not a lever to increase the GHG emissions mitigation burden. In response, M-GCC-8 delineates a process whereby the proposed Project can request a modification to the GHG emissions mitigation burden should the regulatory or technological environment change; such modification would be considered by the County's Board of Supervisors pursuant to a noticed public hearing process. Additionally, if such modification is requested, the proposed Project is required to demonstrate the continuing adequacy of modeling inputs used in the EIR that are not proposed to be altered as part of the "true-up" process, thereby ensuring a balanced re-quantification of all of the proposed Project's emissions sources. The measure's "true-up" parameters are designed to respect the finality of the CEQA process, absent the request for an additional discretionary entitlement or approval. The County also notes that, as a general matter, it does not expect proposed Project-related GHG emissions to increase beyond those reported in the EIR for at least two reasons: (1) emissions modeling conducted for CEQA purposes often is based on a series of conservative inputs designed to assess impacts; and (2) regulatory and technical developments have continually trended towards more efficiency and fewer emissions.

RO-4-27 The comment states that the EIR's approach is part of "a disturbing trend in the County" to permit "sprawling development projects" to shift their GHG emission reduction parameters "elsewhere." In response, the proposed Project is part of and proposes development parameters that are consistent with the Otay Ranch GDP/SRP approvals issued by the County (and City of Chula Vista) in 1993. As also discussed in the EIR, the proposed Project utilizes a portfolio of effective on-site and off-site strategies to reduce GHG emissions.

As for the Cap-and-Trade Program referenced by the comment, and its limitation on the use of offsets for each entity's annual emissions reduction obligation, the Cap-and-Trade Program regulates stationary source entities, like fuel refineries and electric-generating facilities. Those entities are subject to a gradually declining emissions cap, and subject to much different regulatory controls than the land use development sector since the operational attributes of the source are under common ownership and control. Here, the County—as a local land use jurisdiction—is able to control and regulate discrete aspects of the land use proposal; however, it is not able to control many of the personal decisions, practices, and habits of the proposed Project's residences and other land uses for policy and legal reasons. For additional information on this topic, please see Global Response R1: Carbon Offsets, which explains why the quantitative offset limits imposed on Cap-and-Trade Program covered entities do not apply to land use development projects.

The County also has determined that its approach is consistent with CARB's recommendation in *California's 2017 Climate Change Scoping Plan*, as on-site environmental design considerations and mitigation measures have been prioritized.

RO-4-28 The comment states that the EIR "fails to discuss the potential environmental effects associated with relying on the purchase of out-of-County offsets." As discussed in Global Response R1: Carbon Offsets, CEQA Guidelines Section 15126.4(a)(1)(D) states: "If a mitigation measure would cause one or more significant effects in addition to those that would be caused by the

project as proposed, the effects of the mitigation measure shall be discussed but in less detail than the significant effects of the project as proposed." In this instance, and based on the type of information reasonably available at this time, the proposed Project's utilization of carbon offsets—via implementation of mitigation measures M-GCC-7 and M-GCC-8—is not expected to result in one or more significant effects because carbon registries prioritize protocols for offset project types that can create significant co-benefits and avoid those with significant negative social and environmental impacts. In support of this determination, please see Climate Action Reserve's webpage regarding "Criteria for Protocol Development" included as Attachment RO4.1. See also Climate Action Reserve's Program Manual (November 12, 2019~~September 1, 2015~~) included in mitigation measure M-GCC-7 Attachment "A.", found in Appendix C-29 of the Final EIR.~~as RO4.2.~~ As provided in Section 2.4.6 of the Program Manual, the Climate Action Reserve "requires project developers to demonstrate that their GHG projects will not undermine progress on other environmental issues such as air and water quality, endangered species and natural resource protection, and environmental justice." In order to ensure that such adverse effects are avoided, the Climate Action Reserve coordinates with government agencies and environmental representatives, requires project developers to demonstrate compliance with all applicable laws (including environmental regulations), and may include – within individual offset protocols – requirements specifically designed to serve as environmental and social safeguards. Other carbon registries recognized by the proposed Project's mitigation framework deploy the same overall approach to environmental protectionism. ~~——~~

~~The commenter references mitigation measures M-GCC-7 and M-GCC-8, which allow for carbon offsets to be purchased from Verra, which is one of the Offset Project Registries certified in the state of California Air Resources Board. The project has not identified a specific Offset Project Registry at this time, but if an offset program is chosen in the state of California it will be approved by the California Air Resources Board. T~~As an example, the comment expresses a concern that the generation of renewable energy from wind farms, among other sources, can have an impact on wildlife. The comment specifically refers to wind farms designed to produce renewable energy as one form of offset-generating project that may significantly impact wildlife. A proper evaluation of impacts attributable to a proposed wind farm would require additional information, such as the location of the project, the types of wildlife species present, the project site design, that is not available now. As such, the analysis requested by the commenter is speculative (see CEQA Guidelines Section 15145).

That being said, as noted above, the registries prioritize the avoidance and minimization of significant negative environmental impacts from carbon offset projects. For example, the Climate Action Reserve's Program Manual states that "the Reserve strives to ensure that the offset projects it registers are **not harmful**. Project activities should not cause or contribute to negative social, economic or environmental outcomes and ideally should result in benefits beyond climate change mitigation." (Emphasis in original.) The American Carbon Registry Standard similarly provides that the "[e]nvironmental and community impacts [of offset projects] should be net positive, and projects must 'do no harm' in terms of violating local, national, or international laws or regulations." Verra also provides in its VCS Standard that "[p]roject activities shall not negatively impact the natural environment or local communities." (Each of the registry

documents referenced in this paragraph is available in Mitigation Measure M-GCC-7 Attachment "A.")

RO-4-29 The comment states that the American Carbon Registry accredits offsets generated by carbon capture and storage projects, which have the potential for significant health and safety risks including the potential to contaminate or degrade water supplies. The comment further states the EIR must discuss the effects of such projects that may themselves have considerable land use, biological, or other impacts. In response, a proper evaluation of impacts attributable to a proposed carbon capture and storage project would require additional information, such as the location of the project, the depth of groundwater, the presence of contaminants of potential concern and the project site design, that is not available now. As such, the analysis requested by the commenter is speculative (see CEQA Guidelines Section 15145). Please also see Response to Comment RO-4-28 above for information regarding the registries' efforts to prioritize the avoidance and minimization of significant negative environmental impacts from carbon offset projects.

RO-4-30 The comment provides background information regarding the parameters of the State Planning and Zoning Law. The comment does not identify any specific issue with the environmental analysis presented in the 2019 ~~Recirculated Portions of the Draft EIR~~Recirculation Package. Therefore, no further response is provided or required.

RO-4-31 The comment states that the County's reliance on mitigation measures M-GCC-7 and M-GCC-8 to offset the Project's GHG emissions is inconsistent with General Plan Goal COS-20. In response, please see Global Response R1: Carbon Offsets, as well as Appendix E-1 (and Attachment A thereto) of the 2019 ~~Recirculated Portions of the Draft EIR~~Recirculation Package. As explained therein, the proposed mitigation measures are consistent with the General Plan because the measures would reduce Project-related GHG emissions beyond a level necessary to align with the statewide reduction targets established by AB 32 and SB 32. Based on a review of the factual record, legal precedent and policy prerogatives described in the referenced record documents (see Global Response R1: Carbon Offsets of the Final EIR, and Appendix E-1 (and Attachment A thereto) of the 2019 ~~Recirculated Portions of the Draft EIR~~Recirculation Package), Goal COS-20 and Policy COS-20.1 do not – and were never intended to – impose any restrictions on the use of all available measures to reduce GHG emissions under the County's jurisdiction and, for this reason, permit the use of out-of-County offsets as a tool to reduce GHG emissions.

RO-4-32 The comment states that the EIR is deficient "because it incorrectly claims that the Project is consistent" with General Plan Goal COS-20. The comment also references a decision by a judge of the San Diego County Superior Court. In response, this comment is referring to a separate judicial proceeding~~ presently on appeal~~ concerning the County's February 2018 adoption of a Climate Action Plan (CAP). Please see Global Response R1: Carbon Offsets and Global Response R2: County of San Diego Climate Action Plan~~CAP Consistency~~ for information responsive to this comment. As discussed in Response to Comment RO-4-31, substantial record evidence supports the County's interpretation of General Plan Goal COS-20 and consistency determination.

RO-4-33 The comment refers to the Golden Door Properties, LLC v. County of San Diego case. The comment also cites an excerpt from a judicial determination made by the San Diego County

Superior Court in the referenced CAP litigation. In response, ~~the judicial determination is presently on appeal. A~~as discussed in Global Response R2: County of San Diego Climate Action Plan~~CAP Consistency~~, the proposed Project does not tier from, rely on, or use the mitigation measures at issue in the CAP litigation, and has prepared a CEQA analysis independent from that prepared by the County for the CAP. Therefore, ~~while California's judicial system continues to adjudicate the sufficiency of the County's CEQA compliance for the CAP,~~ the County can continue to process land use development applications and requested entitlements for the proposed Project.

RO-4-34 The comment states that the County's persistent use of off-site mitigation for projects' in-County GHG emissions, its reliance on a "tortured and unsupported reading of COS-20, and failure to analyze the proposed Project's inconsistency with COS-20 violate CEQA and the CEQA Guidelines." Please see Response to Comment RO-4-31.

RO-4-35 The comment expresses the opinion that the County should not approve the proposed Project "until it has developed and adopted a legally sufficient [CAP] and can analyze and mitigate the Project's GHG emissions consistent with that plan." Please see Response to Comment RO-4-33.

RO-4-36 The comment states the EIR's analysis of and mitigation for the proposed Project's impacts to biological resources remain deficient. The commenter also expresses disappointment that the 2019 Recirculation Package did not contain a new, updated, and legally sufficient analysis of the proposed Project's impacts to biological resources. This comment serves as an introduction to specific issues raised in following comments. Please refer to Responses to Comments RO-4-37 through RO-4-64.

RO-4-37 The comment states the EIR's analysis of and mitigation for impacts to Quino checkerspot butterfly are inadequate. This comment serves as an introduction to specific issues raised in comments that follow. The comment also describes historical information on the Quino checkerspot butterfly. Please refer to Responses to Comments RO-4-40 through RO-4-60.

RO-4-38 The comment describes population dynamic information on the Quino checkerspot butterfly. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-39 The comment describes population dynamic and historical information on the Quino checkerspot butterfly. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-40 The comment states that the EIR fails to disclose that the proposed Project will destroy "core" critical habitat for the Quino checkerspot butterfly. The comment further states while the EIR discloses that the proposed Project will have direct and indirect effects on critical habitat, it does not acknowledge any potentially significant impacts associated with the destruction or adverse modification to critical habitat. The comment also describes the definition of critical habitat. In response, critical habitat impacts are quantified in the 2019 Recirculation Package, Chapter 4.0 and in the Biological Technical Report for Alternative H. A determination of "destruction or adverse modification" of designated critical habitat, as defined under the federal Endangered

Species Act, is made by the USFWS in their Biological Opinions for Section 7 consultations. As such, it is a determination under federal law, not a CEQA issue, and therefore is not included in the SEIR. Pre-project meetings with the U.S. Army Corps of Engineers (USACE) concluded that the Corps will take jurisdiction of all of the Waters of the U.S. onsite, and, as such and due to their locations throughout the site, the USACE will also address the impacts to Quino checkerspot butterfly.

RO-4-41 The comment describes information from the 2003 Recovery Plan on the Quino checkerspot butterfly. The comment does not raise an issue regarding the adequacy of the environmental analysis~~;~~; therefore, no further response is provided.

RO-4-42 The comment describes information from the 2003 Recovery Plan and 2009 update published by the USFWS on the Quino checkerspot butterfly. The comment does not raise an issue regarding the adequacy of the environmental analysis~~;~~; therefore, no further response is provided.

RO-4-43 The comment states that the majority of the proposed Project's development footprint encroaches on the designated Unit 8 critical habitat area and would directly destroy 483 acres. In response, this comment is referring to the proposed Project's impacts as discussed in Section 2.3 of the Draft EIR, which was previously circulated for public review. The impacts to critical habitat resulting from Alternative H are described in the 2019 Recirculation Package in Table 8 of Appendix D-3. A determination of "destruction or adverse modification" of designated critical habitat, as defined under the federal Endangered Species Act, is made by the USFWS in their Biological Opinions for Section 7 consultations. As such, it is a determination under federal law, not CEQA. Thus, it is not included in the Draft EIR. The 2019 Recirculation Package has been revised to include the reference to the 2009 update of the Recovery Plan.

RO-4-44 The comment states the County has elsewhere acknowledged the high conservation value of the project site for Quino checkerspot butterfly. The comment letter includes an attachment that is a "QCB Heat Map" prepared by the County in conjunction with a proposed "Quino Amendment" to the South County MSCP. The commenter plotted the proposed Project's development footprint over the Heat Map, which shows the development footprint lies mostly on habitat at the highest range of conservation value. In response, the County acknowledges that, based on presence of host plant, much of the Village 13 property is suitable for Quino checkerspot butterfly suitable habitat within the entire site was assumed occupied regardless of whether butterflies were detected during the multiple survey efforts.

RO-4-45 The comment describes information from threshold of significance Criterion G. The comment does not explain the specific "deficiency" referred to; therefore, no further response can be provided.

RO-4-46 The comment states that the EIR determined that impacts to the core wildlife area are considered less than significant because approximately 1,089 acres would be preserved on-site, which is expected to be sufficient to support viable populations of common and sensitive species. The comment then states that the analysis in the EIR makes no mention of Quino checkerspot butterfly and provides no evidence to support the conclusion that the preserved open space is sufficient to support viable populations of this endangered species. Contradictory to the comment, the DEIR

and SEIR do not conclude that impacts to wildlife are less than significant. In fact, impacts are considered significant to the following: vegetation due to direct impacts, habitat due to indirect impacts, temporary impacts, Cornerstone Lands, City of Chula Vista offsite areas, jurisdictional wetlands, vernal pools, sensitive plants and habitats per the RMP2, Quino checkerspot butterfly, San Diego fairy shrimp, wildlife movement, California gnatcatcher, burrowing owl, and least Bell's vireo. Section 2 of the Biological Technical Report, Sensitive Wildlife Species, has a thorough review of the Quino checkerspot butterfly, the impacts, the detailed host plant mapping, and the preservation of the species including acreage of preserved suitable habitat and necessary habitat features such as hilltops and ridgelines. The following is a summary from the D-3 appendix of the preservation that is focused on this species: "A biological open space easement would be placed over the Otay Ranch RMP Preserve and Conserved Open Space on site, for a total of 1,177.03 acres (Table 2). In order to mitigate for impacts to occupied Quino checkerspot butterfly habitat specifically, Alternative H proposes to conserve approximately 1,107.72 acres of suitable, restored, or occupied coastal sage scrub for Quino checkerspot butterfly on site, all of which is located within the existing Otay Ranch RMP Preserve and Conserved Open Space areas. The 1,107.72 acres includes coastal sage scrub and disturbed coastal sage scrub within the Otay Ranch RMP Preserve including the temporary allowable impact areas which will be restored (1,030.87 acres), Conserved Open Space including the area of thornmint that is regularly used by Quino checkerspot butterfly (65.15 acres) and restored or enhanced areas that are currently not suitable (11.70 acres). For the purposes of protecting Quino Checkerspot butterfly habitat, the 1,107.72 acres would be protected through the biological open space easement discussed above. Thus, impacts (389 acres) would be mitigated at a mitigation ratio of at least 2.85:1. Additional mitigation may be required as determined by the wildlife agencies during the take authorization process for Quino checkerspot butterfly."

RO-4-47 The comment states the EIR fails to disclose the proposed Project's impacts to existing critical habitat for Quino checkerspot butterfly from the proposed Project's edge effects. The comment refers to dust, invasive plants and animals, noise, increased wildfire risk, lighting, and other byproducts of development as edge effects, including direct and indirect impacts~~.~~. Indirect impacts resulting from Alternative H are reduced from the proposed Project footprint with the design with much less edge. Additionally, the Otay Ranch Edge Plan provides analysis and description of the edge 100 feet from the project boundary, which is designed to prevent trespass, impacts due to lighting and noise, intrusion by non-native plant species, and disruption due to pets. Indirect impacts are addressed by the following mitigation measures: M-BI-1b through 1f, 14, 15, and 18.

RO-4-48 The comment states that the project's edge effects would affect the species (Quino checkerspot butterfly) thousands of feet from the development site, effectively creating a large zone of impact that the EIR ignores.

A Preserve Edge Plan was prepared for the proposed Project and is included in the 2015 Draft EIR. A Preserve Edge Plan was also prepared for Alternative H and is included as Appendix D-21 in the 2019 Recirculation Package. Implementation of components of the Preserve Edge Plan is a required element of several mitigation measures designed to avoid and minimize adverse edge effects, including mitigation measures M-BI-1f (Fencing and Signage), M-BI-13

(Stormwater Pollution Prevention Plan), and M-BI-14 (cover of stockpiles, no toxic chemicals, no invasive plant species, no drainage into the preserve, slope stabilization is implemented, noise is minimized and no lighting of the Preserve is allowed).

RO-4-49 The comment describes general information regarding behavior of the Quino checkerspot butterfly larvae. The comment also states that, when the caterpillars actively crawl throughout the landscape to find suitable conditions, the caterpillars will "be at risk to being crushed and killed by human trampling from direct or indirect (e.g. vehicles) contact, the incidence of which is greatly increased by the Project." The comment does not raise an issue regarding the adequacy of the environmental analysis~~;~~; therefore, no further response is provided.

RO-4-50 The comment states that "indirect effects of the project include the introduction of invasive exotic plants that will be used for ornamental purposes in the homes, roadway medians, and other developed areas and invasive exotic animals that will outcompete or feed on the Quino checkerspot butterfly". Alternative H includes mitigation measures (M-BI-1b through 1f, 14, 15, and 18) that prohibit planting of non-native invasive plant species within the edge area (the 100 feet of edge that surrounds the development) of the development and fencing to prevent access of both humans and non-native animals. In addition, the Quino Management/Enhancement Plan includes habitat restoration activities including removal of non-native species. As part of the responsibilities of the POM, the management of the Preserve and the Conserved Open Space includes invasive species removal and control of non-native animals.

RO-5-51 The comment states the EIR fails to acknowledge the indirect impacts to the Quino checkerspot butterfly from habitat degradation from edge effects, and the EIR fails to mitigate these impacts or adopt measures that will be effective in reducing or avoiding them. The comment also refers to M-BI-1f (fencing and signage). Mitigation included for the proposed Project and Alternative H for indirect impacts benefits the Quino checkerspot butterfly. Please refer to Responses to Comments RO-4-48 and RO-4-50 and Global Response R4: Quino Checkerspot Butterfly.

RO-4-52 The comment states the FEIR's mitigation for the proposed Project's impact to Quino checkerspot butterfly is inadequate, which is an introductory statement to comments that follow. The comment also discusses Quino checkerspot butterfly habitat and states "the Project would result in the species being less likely to persist during poor environmental conditions or able to build its numbers during good years, placing stress on the metapopulation." The County acknowledges that the Village 13 property supports a core population of Quino checkerspot butterfly. During surveys conducted in 1998, 1999, 2000, 2004, 2008, and 2016, the locations of the butterfly at times have shifted. However, the top of the area occupied by San Diego thornmint, the area along the northern boundary (less so in 2016), the ridgeline in the north-central portion, and the area at the northeastern corner, have been routinely used by the species. Additionally, the ridgelines, which are included in the preserve, are important features for the species. The impact to 389 acres of suitable habitat is mitigated by the preservation of 1,177 acres of Preserve and Conserved Open Space, of which 1,107 is suitable habitat. Impacts to critical habitat would be addressed during the federal permitting process as noted in Response to Comment RO-4-40.

RO-4-53 The comment states that the proposed mitigations for impacts on Quino checkerspot are inadequate to reduce the proposed Project's impacts to less than significant. In response, the

proposed Project will preserve 1,177 acres in the Preserve and Conserved Open Space and a Quino Checkerspot Management/Enhancement Plan will be implemented. The Preserve would be managed by the POM and the Conserved Open Space would be managed by either the POM or other qualified manager. With implementation of mitigation measures M-BI-9a and M-BI-9b, the impacts to Quino checkerspot butterfly would be mitigated to less than significant.

RO-4-54 The comment states that merely requiring the Project applicant to obtain a take permit from the USFWS in the future does not ensure that impacts from the proposed Project will be fully mitigated. The comment also states this measure does not satisfy CEQA's requirements for deferred mitigation and that the EIR does not justify why the application for take permits has been deferred until after CEQA review has been completed and the County Board of Supervisors has approved the project. In response, the take permit process would be conducted under Section 10 or Section 7. The USFWS will issue a Section 10 Take permit provided that the action does not appreciably reduce the likelihood of the survival and recovery of the species in the wild. Similarly, USFWS will issue a Section 7 Biological Opinion provided there is the conclusion of no jeopardy to the species. Thus, a take authorization will be required to provide adequate mitigation for the Quino checkerspot butterfly. There has been coordination with the Wildlife Agencies during the CEQA process. Under Alternative H, the development footprint is consistent with the MSCP development and Preserve boundary, for which an implementing agreement has been signed by the Wildlife Agencies and issued. The Quino checkerspot butterfly Management/Enhancement Plan was provided to the USFWS for their review. Communication has been conducted with the wetland permitting agencies, including the preparation of the Biological Assessment for support of a Section 7 Consultation, all of which has been done prior during preparation of the Final EIR. Finally, wetlands permits are not able to be issued until a final CEQA document has been prepared.

RO-4-55 The comment states the bulk of the EIR's proposed mitigation is "preservation" of 966 acres on the Project site and restoration of an additional 6.3 acres. The comment further states the onsite mitigation is inadequate, proposing to place acreage next to the Project and degraded edge effects, and that a 2:1 ratio with largely onsite habitat will not reduce impacts to less than significant. In response, the comment is addressing the mitigation and acreage for the proposed Project, as presented in the 2015 DEIR that was previously circulated for public review. Alternative H proposes to conserve approximately 1,107.72 acres of suitable, restored, or occupied coastal sage scrub for Quino checkerspot butterfly on site, all of which is located within the existing Otay Ranch RMP Preserve and Conserved Open Space areas. Under Alternative H, impacts to Quino habitat would be mitigated at ratio of 2.85:1.

RO-4-56 The comment states that any mitigation should be based on the biology and ecology of the Quino checkerspot butterfly, and designed to ensure the affected metapopulation will be able to survive. The comment also refers to a 2:1 mitigation ratio and a proposed future Quino Amendment to the MSCP. In response, the comment is addressing the mitigation and acreage for the proposed Project, as presented in the 2015 DEIR that was previously circulated for public review. Under Alternative H, the mitigation ratio would be 2.85:1. These measures are not inconsistent with the County's efforts to prepare a Quino Amendment.

RO-4-57 The comment states that the EIR fails to adopt specific performance measures to ensure that lands set aside for Quino checkerspot butterfly habitat will be managed properly. The comment further states that, instead, the Project applicant will prepare a long-term Management/Enhancement Plan whose only requirement is survey methodology. In response, the Management/Enhancement Plan will require County and Wildlife Agency review and concurrence. The Plan will include, at a minimum, a survey methodology for on-site preserve areas pre- and post-construction to monitor effects on Quino checkerspot butterfly population health, restoration, and enhancement requirements to improve the habitat for the Quino checkerspot butterfly, and adaptive management techniques with contingency methods for changed circumstances. The draft plan includes performance measures that may include but are not limited to restoration and enhancement requirements that outline the percent native cover, percent survival, and percent nonnative cover; quantifiable adaptive management triggers that rely on population monitoring and statistical changes in the population size to then require restoration as noted above or reintroduction of the species and continued restoration of unoccupied areas when population declines are not noted. These measures shall ensure that the potential loss of individuals and the loss of habitat for the species related to the proposed development are adequately offset by measures that will enhance the existing preserved population and shall provide data that will help the species recover throughout its range. In addition, the POM provides preserve management including (but not limited to) such tasks as trespass control, invasive species control, trash removal, monitoring, reporting, and other management tasks.

RO-4-58 The comment states that the County's approach to the Quino Management/Enhancement Plan is contrary to case law (Preserve Wild Santee v. City of Santee). In response, mitigation measure M-BI-9b states the following: "Quino Management/Enhancement Plan: Prior to the issuance of the first grading permit that impacts Quino checkerspot butterfly, the Project applicants shall prepare a long-term Quino Checkerspot Butterfly Management/Enhancement Plan that shall, at a minimum, include a survey methodology for on-site preserve areas pre- and post-construction to monitor effects on Quino checkerspot butterfly population health (Appendix C). This Plan will be submitted to, and be to the satisfaction of, both the Directors of Planning & Development Services, Parks & Recreation, USFWS, CDFW, and the POM. Adaptive management techniques shall be developed within the plan with contingency methods for changed circumstances. These measures shall ensure that the potential loss of individuals and the loss of habitat for the species related to the proposed development are adequately offset by measures that will enhance the existing preserved population, and shall provide data that will help the species recover throughout its range."

RO-4-59 The comment states the EIR fails to adequately analyze cumulative impacts to the Quino checkerspot butterfly. The comment then discusses cumulative impacts analysis as required by the CEQA Guidelines. This comment serves as an introductory statement to the comment that follows. Please refer to Response to Comment RO-4-60.

RO-4-60 The comment states the EIR fails to calculate the total cumulative permanent loss of Quino checkerspot butterfly habitat or evaluate the effect this loss will have on the species. In response, at the time the 2015 DEIR was circulated, impacts to Quino checkerspot butterfly that could result from other projects had not yet been specifically identified. The Final EIR for Village 14

and Planning Areas 16/19, which was released subsequent to 2015, states that the Village 14 Project would result in impacts to 794.7 acres of potential habitat and 502.3 acres of USFWS-designated critical habitat (page 2.4-81). Village 14's EIR contains mitigation measures M-BI-8, 9, and 10, which address impacts to Quino checkerspot butterfly and its habitat. However, the full extent and effectiveness of the mitigation may not be known until the developer obtains incidental take authorization. Similarly, for several other projects analyzed in the 2015 DEIR cumulative analysis (Otay Tech Center, Otay Mesa Generating Project, East Otay Mesa Landfill, Otay Hills Quarry, and Otay Business Park), the specific impacts and mitigation were unknown at the time the 2015 DEIR circulated for public review. Although the analysis for Alternative H did not cite the 2009 five-year Review of the Quino checkerspot butterfly, based on multiple surveys and analysis of the species, it has been addressed as a resilient population of this sensitive species with a population present on the site that will require management and take authorization. New survey information is included in the Appendix D-3 analysis of Alternative H. This new information included a survey for Quino checkerspot butterfly in 2016 and additional rare plant surveys conducted in 2015 after the DEIR was released for circulation. The County acknowledges the Recovery plan as well as the five-year update and Recovery plan update. The applicant will be seeking take authorization under Section 7 and will comply with conditions that are required during the Section 7 consultation. Therefore, the information presented in the 2015 DEIR and the 2019 Recirculation Package is adequate based on the information available at the time.

RO-4-61 The comment states the analysis of and mitigation for the proposed Project's impact to vernal pools and vernal pool species are inadequate. The comment discusses the proposed Project's impact on the K6 vernal pool complex, as presented in their comment letter in 2015. The County acknowledges that the K6 vernal pool complex would be impacted under Alternative H. The MSCP includes the K6 complex area within the development footprint. Multiple years of surveys for San Diego and Riverside fairy shrimp were conducted in 1999, 2000, 2003, 2007–2008, and 2014–2015. These surveys indicate that the pools no longer become inundated. Regardless, the impacts are considered significant, and mitigation measure M-BI-7 is provided for the pools as well as the one pool that was determined as occupied by San Diego fairy shrimp.

RO-4-62 The comment discusses the proposed mitigation options for impacts to the K6 vernal pool complex. The comment states the EIR provides no evidence vernal pool restoration activities would be effective and the mitigation banking fee is "so vague as to be nearly meaningless." In response, CEQA does not require specifying the location of a mitigation bank. Under the permitting process, a suitable bank will require wetland permitting agency review and approval for use as mitigation. A number of vernal pool restoration activities have been documented to be successful within San Diego County. These include locations such as Manzanita Partners in Carlsbad, Fry's vernal pools in San Marcos, and Mission Trails Regional Park pools in San Diego, to name just a few. All of these examples resulted in functional vernal pools that hold water, are occupied by special-status plants, and are occupied by San Diego fairy shrimp. The restoration plan for the K8 complex will be reviewed by the County, Wildlife Agencies, and wetland permitting agencies prior to approval.

RO-4-63 The comment states the proposed Project should, at a minimum, be reconfigured so that the footprint does not cause the destruction of the K6 vernal pool complex or take of San Diego fairy

shrimp. In response, the mitigation (measure M-BI-7) will provide for a greater than net loss replacement of functions and values of the impacted K6 vernal pools. The mitigation will be reviewed during the wetland permitting process. In addition, take authorization will be required for San Diego fairy shrimp impacts with which the applicant will comply. It should also be noted that the MSCP included the K6 and K8 complex areas within the development footprint.

RO-4-64 The comment states the analysis of and mitigation for the proposed Project's impacts to golden eagles are inadequate. The comment further states that the "DEIR incorrectly concludes that the impact 620 acres of foraging habitat would be less than significant because 'other' suitable foraging habitat would be preserved on site." Please see Global Response 2: Golden Eagle.

RO-4-65 The comment states the EIR's fire risk and fire safety analyses are inadequate. The comment further states "to comply with CEQA, the County must provide adequate information and analyses on existing conditions and proposed avoidance, minimization, and mitigation measures…." In response, the Final EIR provides adequate information and analyses regarding wildfire risk for both the proposed Project and Alternative H. Fire Protection Plans (FPPs) (Appendices C-21 and D-21 to the Final EIR). A Wildland Urban Interface (WUI) Plan will be prepared for the project site by the County specific to the Project site prior to occupancy. The WUI will include a risk assessment matrix and step-by-step response plans for emergencies at the Project site. Further, the FPPs include analyses of fire risk, fire behavior, emergency response, fire safety requirements, and evacuation. It should be noted that roughly 70 percent of San Diego County is designated as very high fire hazard severity zone (VHFHSZ). The areas that have not received this designation are the urbanized areas. The fact that an area is designated as a VHFHSZ does not preclude development, but indicates that additional measures are required to address the increased likelihood of wildfire. The Project incorporates all of the required measures and provides for a comprehensive wildfire protection approach that has been shown to perform well in wildfires. For both the proposed Project and Alternative H, the development would be constructed in compliance with all applicable fire codes, including those specifically for VHFHSZ areas. Compliance with the FPP would be ensured during building permit review, and an on-site temporary and permanent fire station would ensure compliance with emergency travel time requirements. As a result, impacts due to wildfires would be less than significant. The fire risk and fire safety analyses in the FEIR are adequate for the public and decision makers to analyze the proposed Project and its alternatives.

RO-4-66 The comment refers to a letter the commenter previously sent on November 13, 2018, to the County Board of Supervisors (Attachment 8 to comment letter RO-4). The commenter states issues raised in the 2018 letter apply to this proposed Project, which are listed and responded to below. Attachment 8 is provided a separate response.

(1) The commenter states that developments in fire-prone natural areas that have historically burned have the highest chance of burning. In response, the FPP includes a discussion of the fire history and fire behavior for both the existing condition and post-development. This comment does not raise a specific issue regarding the adequacy of the environmental analysis in the EIR; therefore, no further response is provided.

(2) The comment states that development in fire-prone areas will lead to more frequent human-caused fires in Southern California., while referencing Attachment 8. The comment provides a summary of inferred "findings" of the Attachment 8 study by Jon E. Keeley. The comment provides no additional supporting information requiring response. Because the study is not directly comparable with the proposed Project and the findings actually conflict with the comment's assertion, the comment raises no new issues with the DEIR or its analysis, and therefore requires no additional response. A thorough response to the Keeley article in the comment's referenced Attachment 8 is provided as RO-4-113.

(3) The comment states public safety in developments like Otay Village 13 cannot be guaranteed. In response, the many fire protection requirements that were specifically developed for buildings within very high fire hazard severity zones provide a reduced risk of structure loss. Village 13 would include structures built to the latest ignition-resistant codes and maintained fuel modification zones. Please refer to the proposed Project's FPP for details regarding the layered approach to fire protection, which includes access, water, defensible space, ignition-resistant structures, ongoing maintenance, and fire response, among others.

(4) The comment states developments like Otay Village 13 contain insufficient fire safety and fire protection plans. In response, San Diego County has developed a comprehensive approach to fire protection planning in fire hazard severity zones and wildland urban interface areas. The approach includes a thorough vetting of the potential fire hazard and risk and requirements for appropriately mitigating them (refer to San Diego County Guidelines for Determining Significance and Report Format and Content Requirements, Wildland Fire and Fire Protection 2010).

(5) The comment states increased human-caused ignitions will increase unnatural levels of smoke. In response, as indicated in response to the comment letter's Attachment 8 (as provided in RO-4-113), the referenced studies regarding unnatural levels of smoke are not supported. Specifically, the required fuel modification buffers between the proposed Project's areas of human use, including roadways within and leading to the Project site where they cross native vegetation areas, minimize the potential for increases in ignitions that become large fires producing unnatural smoke levels. Further, the additional firefighting resources on the site would be in a position to provide fast response to ignitions in the area, minimizing the potential for fire to grow beyond the incipient stage. Firefighters are incredibly adept at extinguishing vegetation and structure fires during typical weather conditions, which occur 90% or more of the time. During fire weather, which occurs during the periods where humidity drops and winds increase (Red Flag Warning conditions), the potential for a vegetation ignition to grow quickly and become a large fire increases. Because of this, having additional fire response resources close to the areas where wildfires can occur is important. Additionally, fire agencies, including SDCFA, deploy additional resources during these periods when the possibility for large wildfires increases, so that they have a higher likelihood of controlling them quickly. The potential for wildfires exists currently due to the unmaintained fuels in the Project area and the existing ignition sources. The proposed Project removes a large area of fuel and converts it to ignition-resistant landscape, providing a buffer between existing communities, further separating smoke

sources from the existing communities, and providing "eyes and ears" in the area for fast fire detection.

(6) The comment states the direct economic impacts of fire are worsening. This comment does not raise an issue regarding the adequacy of the environmental analysis in the EIR; therefore, no further response is provided.

(7) The comment states the devastating environmental, health, social, and economic costs of poorly planned, leapfrog developments in areas that will burn are too great, such that there is no justification to approving this development. In response, this statement expresses the opinion of the commenter. This comment does not raise an issue regarding the adequacy of the environmental analysis in the EIR; therefore, no further response is provided.

RO-4-67 The comment states the proposed Project would increase wildfire risks that could cause residents to lose their homes and the lives of loved ones and first responders. The comment further states the proposed Project could also worsen public health, destroy native ecosystems, and reduce biodiversity. The commenter concludes the DEIR fails to disclose, assess, or mitigate these potential impacts. In response, the fire analysis for the proposed Project and Alternative H included in the Final EIR is considered appropriate for the proposed development, its fire environment, and anticipated wildfire behavior. Please refer to Response to Comment RO-4-66 for additional details regarding the requirements for building within fire hazard severity zones. Additionally, although the Project site is located in a very high fire hazard severity zone, it will have a significantly lower potential of actual loss than other older communities that are also located in a very high fire hazard severity zone or WUI area. This is based upon the distinction between Hazard (which the State categorizes) and Risk (which the state does not quantify). Hazard is the potential fire behavior (i.e., flame length, crown fire occurrence, capacity to generate embers) in the predicted mature vegetation of the area. Risk, however, is the potential for structural loss from said fire. Thus, even if a potential low fire hazard exists in a given area (expected low flame lengths), a home might still be at high risk of ignition if the physical characteristics of the property would facilitate structural ignition (e.g., flammable vegetation next to a home with wood siding). Conversely (and more applicable to the proposed Project), a home might be in a high-hazard area (potential exposure to high flame lengths and ember generation), but may actually be at low risk of ignition if the house is built with ignition-resistant construction materials and adequate defensible space is provided around the home, as will be provided for the proposed Project's homes. This type of defensible community would not result in firefighters or residents being put at higher risk as the entire community offers them temporary safe refuge, if needed, and is considered safer than evacuation. For more information, see Response to Comment RO-2-18.

RO-4-68 The comment states the EIR fails to adequately assess wildfire risk and the potential impacts of more fire ignitions from placing homes and people in high fire-prone areas. The comment also references Governor Newsom's Strike Force Report (2019) and a study by Syphard et al. (2019). The comment further states the EIR fails to adequately assess the proposed Project's impacts on wildfire risk by neglecting to use the best available science. Please refer to Response to Comment RO-4-67 for discussion of Hazard vs Risk. Further, the proposed Project's FPP follows the

County's Guidelines for Determining Significance – Wildland Fire and Fire Protection (2010), which requires a comprehensive analysis approach. The FPP was prepared by a team of professional fire protection planners, fire prevention officers, and foresters; was then reviewed by the County's fire prevention staff; and was accepted. The FPP utilizes the latest technology regarding fire environment assessment, fire behavior, ignition sources, and fire history evaluation. Using these findings, the FPP develops appropriate fire protection methods relying on code standards for building in fire areas (Chapter 7A of the California Building Code), and defensible space appropriate for buffering ignition and ember-resistant homes from direct flames and heat. Further, the FPP evaluates the needs for fire access and resident evacuation, firefighting water needs, and fire response times and volumes. The proposed Project's EIR relies on this comprehensive evaluation presented in the FPP for making significance determinations; based on the FPP's findings, the EIR's determinations are considered appropriate.

RO-4-69 The comment provides a general discussion of fire history and ignition sources for fires in Southern California. The comment also references various studies. The comment then states "the DEIR simply ignores this ample scientific evidence linking sprawl development in high fire-prone wildlands with increased fire risk" and states the project will place homes exposed to maximum fire susceptibility in areas where fire will inevitably burn. In response, please refer to Response to Comments RO-4-65, RO-4-66, RO-4-67, and RO-4-68 for information regarding the safety of the proposed Project and Alternative H and the extent of evaluation and subsequent fire protection requirements that are imposed on the proposed Project and Alternative H. The proposed Project and Alternative H, like all projects in San Diego County's fire hazard severity and WUI areas, are subject to intensive evaluation of the fire hazard and risk, and then are required, through the fire protection plan, to meet the restrictive fire codes that were developed based on after-fire assessments of why homes were lost to fires and why they survived. The homes built to the latest ignition resistance standards have been shown to perform very well against wildfire (refer to the FPP [Appendices C-21 and D-21] and IBHS 2008[1]). The proposed Project and Alternative H exceed the existing code by requiring ember-resistant vents because embers have been identified as the leading cause of structure loss from wildfires. Managed fuel modification zones that set unmaintained fuels back at least 100 feet from structures and the ignition resistance of new buildings significantly minimize the risk of heat and flames causing structural ignition. Therefore, protecting from ember penetration and fire spread has become the focus of fire protection planning, and the proposed Project will be built and maintained so that risk from embers are mitigated.

RO-4-70 The comment states EIR fails to disclose that it is located in areas designated by Cal Fire as having high and very high fire hazard severity zones. The comment also refers to a USA Today analysis that ranked the Project area to be in the worst 1% of states in regard to population-to-evacuation ratios. The comment also discusses wildfire history and states that the EIR fails to adequately describe existing wildfire conditions (wildfire history in the Project area). In response, in regard to the fire history discussion in Section 2.6 of the Draft EIR, this section is not included in the 2019 Recirculation Package; however, the County notes the comment. Regarding the fire

[1] Institute for Business and Home Safety. 2008. *Mega Fires: The Case for Mitigation.* The Witch Creek Wildfire, October 21 – 31, 2007.

history discussion in the Alternative H FPP, Section 3.2.4 states that 13 fires burned through or partially onto the Alternative H site since 1910, according to the CAL FIRE ~~Fire~~ and Resource Assessment Program's database. Land area on the site varies in the number of times it has burned, with some portions of the site having burned up to 5 times, while other areas burned fewer times during this period. The discussion also acknowledges the Harris fire. The Fire Environment Analysis, including wildfire history, in the recirculated Alternative H FPP is comprehensive and complete, meeting the requirements of the *San Diego County Guidelines for Determining Significance for Fire Protection* (2010). Regarding the referenced USA Today article, the conceptual formula used in the article does not incorporate site-specific fire environment and development protections that are specific to the proposed Project and protect it from the type of wildfires that may occur in its vicinity.

RO-4-71 The comment states the EIR fails to acknowledge the potential wildfire hazard from increased human-caused ignitions in the Project area. The comment further states the EIR fails to mention the increase of electrical equipment associated with Alternative H. Please refer to Response to Comments RO-4-66 and RO-4-67 regarding human-caused ignitions and the measures provided to minimize both ignitions and spread to off-site fuels. In addition, Alternative H provides an on-site fire station that would be able to provide response to a fire within the Project area and vicinity. All Project-related electrical transmission distribution and feeder lines will be underground, eliminating the potential for vegetation ignitions. The combination of interior sprinklers that are very successful in containing structural fires and the fast response from an on-site fire station minimizes the likelihood that fires igniting in the developed portions of Alternative H would spread off-site. The periods where fire spread would be at highest possibility would be during Red Flag Warning conditions. The Alternative H Homeowner's Association will have an active outreach program, partnering with the on-site firefighters to inform and educate residents about proper protections during these conditions, including avoiding use of outdoor electrical items and gas-powered equipment and preparedness for the possibility that wildfire could occur. The measures detailed in the Alternative H's FPP were considered robust and meeting the County's strict requirements that result in communities that are defensible.

RO-4-72 The comment states the DEIR's mitigation for wildfire impacts is inadequate. The comment further states the EIR's "threadbare mitigation for human ignitions – most of which is already required by law – is insufficient to mitigate the increased risk of human ignitions due to the Project and the increased strain on firefighting resources…." Please refer to Response to Comments RO-4-66, RO-4-67, and RO-4-71 for a discussion of human-caused ignitions and the measures provided to minimize occurrences. The addition of an on-site fire station provides local, fast response to medical and fire calls, including wildfire ignitions near the proposed Project. It would also be one component of an overall wildfire response during a larger event that adds resources for suppression and protection. In response, the wildfire-related impacts for Alternative H were determined to be less than significant with implementation of Environmental Design Considerations, which would result in ignition-resistant, highly defensible communities. The comment regarding fire resistant versus fire proof does not raise a specific issue regarding adequacy of the EIR. Therefore, no further response is required.

RO-4-73 The comment states the EIR does not provide a community protection and evacuation plan; instead, the EIR states a plan will be prepared prior to occupancy. The comment states that this amounts to improperly deferred mitigation. In response, CEQA requires a project to analyze whether the project would impair implementation of or physically interfere with an adopted emergency evacuation plan, not to provide an evacuation plan. A WUI plan will be prepared for the proposed Project by the SDCFA. The WUI is an internal document for emergency responders and will not be released for public review.

RO-4-74 The comment states even if a Community Protection and Evacuation Plan were provided, a public safety or evacuation plan may not be enough to safeguard people and homes from fires. The comment also makes statements regarding wildfires in general, such as the Camp Fire in Butte County, and other fires in California. The comment further states the EIR fails to adequately assess the danger of fast-moving wildfires and mitigate the resulting impacts. Please see Response to Comments RO-2-15 and RO-4-73.

RO-4-75 The comment states a Community Protection and Evacuation Plan should also include evacuation routes, but that, in the chaos of wildfires, designated evacuation routes may not be enough. The comment then makes speculative statements regarding wildfires and evacuations in general. The comment does not raise a specific issue regarding the adequacy of the environmental analysis in the EIR~~;~~; therefore, no further response is provided.

RO-4-76 The comment states the language in the EIR is vague regarding educating the community regarding wildfire and there appears to be no mandatory requirement to inform property owners about maintenance of structures, nor is there an enforcement mechanism to ensure property owners are compliant with fire safety regulations. The comment also discusses external fire sprinklers and states the proposed Project does not include this feature. The comment concludes the EIR fails to consider additional feasible mitigation for the proposed Project's wildfire impacts. In response, please refer to Alternative H FPP (Appendix D-21 to the EIR), Section 9.1 regarding Wildfire Education. The section states: "Village residents and occupants of commercial and resort facilities will be provided on-going education regarding wildfire, the CEP, and this FPP's requirements." All of the FPP measures, whether required or recommended, become conditions of the project with the FPP's acceptance by the San Diego County Fire Authority (SDCFA). Regarding exterior fire sprinklers, their use has been considered unnecessary for new homes built to the latest ignition-resistant codes (Chapter 7A of the Fire Code), based on after action loss and save studies. The fact that the exterior fire sprinklers are not required in the code, indicates that the highly ignition-resistant structures required by San Diego County can withstand significant fire without them. Further, they require additional water capacity, require ongoing maintenance and inspections, and are considered more appropriate to protect older homes that are not already hardened per the code and/or cannot provide adequate fuel modification setbacks. The exterior sprinklers may be appropriate in these cases as a mitigation measure but are not necessary in a new, highly ignition-resistant master planned community in San Diego County (National Fire Protection Association Wildfire Research Fact Sheet https://www.nfpa.org/-/media/Files/Firewise/Fact-sheets/FirewiseFactSheetsExteriorSprinklers.pdf).

RO-4-77 The comment states the DEIR fails to adequately assess and mitigate the impacts to special-status species due to increased human-caused ignitions. Please refer to Responses to Comment RO-4-

66, RO-4-67, and RO-4-71 regarding the potential for human-caused ignitions and measures to reduce those wildfire risks.

RO-4-78 The comment states the Project area is dominated by chaparral and sage scrub, native California habitats that are adapted to infrequent (every 30 to 150 years) large, intensity crown fire regimes. The comment further states if these regimes are disrupted, habitats are degraded and if fires occur too frequently, type conversion occurs and native shrublands are replaced by non-native grasses and forbs. In response, it is agreed that too frequent occurrence of wildfire will degrade habitat over time and potentially enable non-native grasses to establish, resulting in higher flammability fuels with lower intensity than shrublands. However, as detailed in Alternative H, Section 3.2.4, FPP Fire History, wildfire has burned onto the Project site 13 times since 1910, burning much of the same wildland areas in each fire event. The average interval is less than 8 years over the last 100+ years; however, approximately 1,662 acres of the 1,869-acre Project site remains as chaparral and sage scrub. It is not anticipated that the fire return interval would increase dramatically with the proposed Project's existence, particularly given the measures to minimize the likelihood of ignitions and spread to offsite fuels. Studies indicate that even with older developments that lacked the fire protections provided the Proposed Project, wildfires declined steadily over time (Syphard, et. al., 2007 and 2013) and further, the acreage burned remained relatively constant, even though the number of ignitions temporarily increased. This is due to the conversion of landscapes to ignition resistant, maintained areas, more humans monitoring areas resulting in early fire detection and discouragement of arson, and fast response from the fire suppression resources that are located within these developing areas. While it is true that humans are the cause of most fires in California, there is no data available that links increases in wildfires with the development of ignition resistant communities. The Project will include a robust fire protection system, as detailed in the Project's FPP. This same robust fire protection system provides protections from on-site fire spreading to off-site vegetation. Accidental fires within the landscape or structures in the Project will have limited ability to spread. The landscape throughout the Project and on its perimeter will be highly maintained and much of it irrigated, which further reduces its ignition potential. Structures will be highly ignition resistant on the exterior and the interiors will be protected with automatic sprinkler systems, which have a very high success rate for confining fires or extinguishing them. The project will be a fire adapted community with a strong resident outreach program that raises fire awareness among its residents. Therefore, potential impacts to special status species would be reasonably anticipated to be negligible. Refer to Responses to Comments RO-4-66, RO-4-67, and RO-4-71 regarding potential for human-caused ignitions and measures to reduce wildfire risk.

RO-4-79 The comment states the DEIR fails to adequately account for the effects of climate change on wildfire risk. The comment further states climate change is creating hotter and drier conditions that make natural areas more vulnerable to human-caused ignitions. The comment then states there is no discussion of climate change and wildland fires in the EIR or the FPP. In response, the FPP evaluates the apex condition for vegetation surrounding the proposed Project. This is considered a worst-case condition that would produce the highest flame lengths. It is speculative at this point to presume future fire conditions based on climate change. Research indicates that vegetation in Southern California may convert to lighter fuels as the result of more frequent fires. This would result from drier, hotter climates where fuels would convert to lighter flashy

fuels through repeated wildfires and a change in the fire regime to one with lower intensity and faster spread rates.

RO-4-80 The comment states the EIR fails to adequately assess and mitigate the potential health and air quality impacts from increased smoke from human-caused ignitions. The comment also states that housing extending into fire-prone habitats increases the frequency and toxicity of smoke exposure to communities in and downwind of the fires, which can lead to harmful public health impacts. In response, the proposed Project's landscaped and irrigated areas and fuel modification/ management zones, as well as the paved roadways and ignition-resistant structures, would result in reduced fire intensity and spread rates around the Project vicinity, creating defensible space for firefighters. Additionally, provisions for a fire station on the Project site would meet the County threshold of a 5-minute response time to wildfire ignitions within the proposed Project boundary and increase the likelihood of successful initial attacks that limit the spread of wildfires. This fire station would also become part of the regional fire service delivery plan for the SDCFA for this portion of the County and would support fire and emergency service provision in neighboring communities. Modern infrastructure and the latest ignition-resistant construction methods and materials would be used by Project-related development. Further, all structures are required to include interior, automatic fire sprinklers, consistent with the fire codes. These and other features designed into the proposed Project are discussed more thoroughly in the proposed Project's FPP. The project removes a large area vegetative fuel and converts it to ignition-resistant landscapes. The fire protection measures result in a landscape that is ignition resistant and less likely to result in fire and smoke than the existing condition, which is a mix of vegetation types. Further, these same features that protect the proposed Project, also protect the preserved open space vegetation by providing buffers and modified fuel setbacks in the case that a fire on-site ignites. These buffers minimize the potential for fire to spread off-site. Lastly, the proposed Project represents a large fuel break, providing further separation between existing communities and a large, preserved fuel bed to the east, reducing potential for smoke and air quality impacts from the existing condition.

Further, the proposed Project would not result in significant impacts attributable to the exacerbation of wildfire risks:

> The potential for wildland fire hazards in and around the Project site is high because planned open spaces and off-site areas are sparsely covered with chaparral and other vegetation, which, when coupled with the seasonal hot and dry conditions in the area, have the potential to create fuel for wildland fires. As stated above, the Project would be constructed in compliance with all applicable fire codes, the applicant has caused an FPP [Fire Protection Plan] to be prepared and compliance with the FPP would be assured during building permit review by the FAHJ [Fire Authority Having Jurisdiction] and San Diego County Fire Authority, and an on-site temporary and permanent fire station would ensure compliance with emergency travel time requirement. As a result, the Project would have a less than significant impact due to wildfires. (2015 Draft EIR, page 2.6-24; see also pages 2.6-20 through 2.6-24.)

While the proposed Project would not exacerbate wildfire risk for the reasons discussed in EIR Section 2.6.2.5, in response to public comment, this response provides background

information regarding the pollutant concentrations and effects of wildfire smoke. According to USEPA *Wildfire Smoke – A Guide for Public Health Officials*,[2] wildfire smoke is composed of a mixture of air pollutants of which particulate matter (PM) is the principal public health threat. While particles from wildfire smoke can vary in size, approximately 90% of total PM emitted from wildfires consists of fine particles (i.e., $PM_{2.5}$, particles 2.5 μm in diameter or smaller)[3,4]. The scientific evidence does not indicate that PM generated from wildfire smoke is more or less harmful than PM emitted from other sources[5,6]. The effects of PM exposure range from eye and respiratory tract irritation to more serious disorders, including reduced lung function, bronchitis, exacerbation of asthma, heart failure, and premature death. Short-term exposures (i.e., days to weeks) to $PM_{2.5}$, a major component of smoke, are associated with increased risk of premature mortality and aggravation of pre-existing respiratory and cardiovascular disease. In addition, $PM_{2.5}$ is a respiratory irritant, and exposures to high concentrations can cause persistent cough, phlegm, wheezing, and difficulty breathing.

Ground-level ozone also is affiliated with wildfire, but is less of a concern from wildfires than PM. Ozone can cause effects such as reductions in lung function, inflammation of the airways, chest pain, coughing, wheezing, and shortness of breath. These effects can be more serious in people with asthma and other lung diseases. Ozone may also affect cardiovascular health.

Carbon monoxide is also present in wildfire smoke. Typically, exposures to carbon monoxide from wildfire smoke do not pose a significant hazard to the public, except to some at-risk populations and firefighters very close to the fire line.

Most healthy adults and children will recover quickly from smoke exposure and will not experience long-term health consequences. However, certain at-risk life stages and populations may be at greater risk of experiencing severe acute and chronic symptoms. Children and populations with pre-existing respiratory and cardiovascular disease should be particularly diligent about taking precautions to limit exposure to wildfire smoke.

It is not feasible to quantitatively assess, for purposes of project-level CEQA analysis, potential health and air quality impacts from increased smoke from a hypothetical wildfire scenario that may be attributed to a human- or natural-caused ignition. To do so would require speculation as to the occurrence, frequency, location, intensity, and duration of wildfire. Smoke levels in populated areas also can be difficult to predict due to their dependence on a suite of local terrain, weather, and fire behavior-based factors (such as fuel loads). As indicated, weather conditions, such as wind, temperature, and humidity, contribute to fire behavior and smoke accumulation. For example, winds bring a fresh supply of oxygen to the fire and push the fire into new fuels. Winds also move smoke away from the fire and contribute to atmospheric

[2] USEPA. 2019. *Wildfire Smoke – A Guide for Public Health Officials.* EPA-452/R-19-901. August.

[3] Vicente A, Alves C, et al. Emission factors and detailed chemical composition of smoke particles from the 2010 wildfire season. Atmospheric Environment 2013; 71:295-303.

[4] Groß, S., Esselborn, M., Weinzierl, B., Wirth, M., Fix, A., and Petzold, A. Aerosol classification by airborne high spectral resolution lidar observations. Atmos. Chem. Phys 2013; 13, 2487–2505. doi:10.5194/acp-13-2487-2013.

[5] U.S. Environmental Protection Agency. (2009) Integrated Science Assessment (ISA) for Particulate Matter (Final Report, Dec 2009). U.S. Environmental Protection Agency, Washington, DC, EPA/600/R-08/139F, 2009.

[6] DeFlorio-Barker S, Crooks J, Reyes J, Rappold AG. Cardiopulmonary effects of fine particulate matter exposure among older adults, during wildfire and non-wildfire periods, in the United States 2008-2010. Environ Health Perspect 2019;127(3):37006. doi: 10.1289/ehp3860.

mixing, meaning smoke impacts to the public may be lessened near the fire although winds can move smoke long distances into communities far from where the wildfire is burning.

Once smoke enters the atmosphere, its concentration at any one place and time depends on mechanisms of transport and dispersion. Transport refers to whatever process may carry a plume vertically or horizontally in the atmosphere. Vertical transport is controlled by the buoyancy of the smoke plume and stability of the atmosphere. Horizontal transport is controlled by wind. The larger the volume of space that smoke is allowed to enter and the farther it can be transported, the more dispersed and less concentrated it will become. The intense heat generated by an active wildfire drives smoke high into the air where it remains until it cools and begins to descend. As smoke moves downwind, it becomes more diluted and often more widespread, eventually reaching ground level.

Terrain also affects localized weather. For example, as the sun warms mountain slopes, air is heated and rises, bringing smoke and fire with it. After sunlight passes, the terrain cools and the air begins to descend. This creates a downslope airflow that can alter the smoke dispersal pattern seen during the day. These daily cycles sometimes help predict repeating patterns of smoke impacts in communities.

The most common advisory during a wildfire-related smoke episode is to stay indoors, where people can better control their environment. Whether at home or in a public space, indoor environments that have filtered air and climate control can provide relief from smoke and heat. Environmental and public health agencies have advised people to consider setting air conditioners in their homes to recirculation mode, if possible, to reduce the intake of pollutants.

While it is acknowledged that buildings could contain plastics, metals, and various stored chemicals that release toxic chemicals when burned, such as pesticides, solvents, paints, and cleaning solutions, it is not feasible to assess, for purposes of project-level CEQA analysis, potential health and air quality impacts from the burning of such materials within buildings. To do so would require speculation as to the occurrence, frequency, location, intensity, and duration of wildfire, as well as speculation as to the presence and amount of materials that could release toxic chemicals when burned.

In summary, the proposed Project does not have factors that would exacerbate wildfire risk; as a result, the proposed Project would not expose its occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire. While no significant impact would result, it also is noted that there is no model or methodology available that feasibly allows for a quantitative evaluation of a hypothetical wildfire event's smoke-related pollutant concentrations and corresponding health effects.

RO-4-81 The comment states that increased fire frequency due to human activity and ill-placed developments lead to increased occurrences of poor indoor and outdoor air quality from smoke, which can have public health events. The comment also states that various studies have found hospital visits increase during and/or after fire events. The comment concludes the EIR fails to adequately assess and mitigate the proposed Project's potential impacts of increased smoke exposure due to increased human-caused ignition. The County disagrees with the comment's assertion that the proposed Project increases the probability of ignition occurring within its footprint and finds that the previously provided information used to support the assertion does

not introduce any substantial evidence supporting the statement. While it is true that humans are the cause of most fires in California, there is no data available that link increases in wildfires with the development of ignition-resistant communities.

This type of development with an unbroken landscape (as opposed to low-density wildland urban intermix projects) has been found to perform well against wildfires (Syphard, et al. 2015: Fires at the Wildland Urban Interface: Lessons from Southern California[7]; IBHS 2008[8]). One study (Balch et al. 2016: Human-started wildfires expand the fire niche across the United States[9]) indicates that there can be initial increase in the "likelihood" of fires, but that this potential decreases as characteristics of the built urban environment and increased suppression efforts reduce it. Additionally, the proposed Project includes managed landscapes and wide fuel modification zones that will provide protection for the proposed Project, but also act as a buffer between on-site fires and the natural vegetation areas. In fact, FMZs were originally established to prevent structure fires from spreading into the wildland areas. Therefore, the dual role of FMZs is designed to minimize the likelihood that on-site fires can move offsite. If an on-site fire resulted in a wildfire downwind of the proposed Project, there is a limited fuel bed that could burn under fire weather conditions, but would be limited in its ability to create a significant wildfire due to the lack of fuel bed area.

Fires that start on site would not have the readily ignitable fuels to sustain or spread within the site's landscapes. Further, structure fires would be effectively contained or suppressed by provided automatic interior fire sprinklers to be fitted in every structure. Combined with the fast response from the on-site station, it would be difficult for an on-site fire to spread to off-site areas before responding firefighters could begin their firefighting tactics. Please refer to Response to Comment RO-4-80regarding potential for exposure of Project occupants to pollutant concentrations.

RO-4-82 The EIR fails to adequately assess and mitigate the impact of increased wildfires on fire protection services and utilities. The comment also states the development would necessitate significant firefighting costs from both state and local authorities. In response, this comment is speculative that the proposed Project will increase the cost to fight wildfires. The DEIR (2015) and the updated Chapter 4.0 Alternatives and associated appendices from the 2019 Recirculation Package address potential impacts to public services. The Public Facilities Financing Plan (Appendix IV to the Specific Plan Area for the proposed Project and Appendix IV to the Specific Plan Area for Alternative H) addresses the financial aspects of the proposed Project and Alternative H.

[7] Syphard, Alexandra, Jon E. Keeley, Tess Brennan. 2015. "Fire at the Wildland Urban Interface: Lessons from Southern California. Presentation. Available at: https://static1.squarespace.com/static/545a90ede4b026480c02c5c7/t/578d5aad3e00bef453aea6eb/1468881611437/Syphard_WUIFire_AEPApril5_reduced.pdf

[8] Institute for Business and Home Safety. 2008. *Mega Fires: The Case for Mitigation.* The Witch Creek Wildfire, October 21 – 31, 2007. 47 pp.

[9] Balch, Jennifer K. Bethany A. Bradley, John T. Abatzoglou, R. Chelsea Nagy, Emily Fusco, Adam L. Mahood. 2016. *Human-started wildfires expand the fire niche across the United States.* PNAS 114, 11. March.

RO-4-83 The comment discusses fire hazards, longer fire seasons, and working conditions for firefighters throughout the state of California. The comment does not raise an issue regarding the adequacy of the environmental analysis~~;~~; therefore, no further response is provided.

RO-4-84 The commenter expresses concerns about the mental state of firefighters being affected from working on active wildfires too often. This comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-85 The comment states the EIR fails to adequately assess and mitigate the impacts to fire protection services. The comment also states that a statement in the FPP for the proposed Project suggests that a permanent fire station may never be built, if funding is not secured. In response, the requirement for a permanent fire station on site will be included in the Conditions of Approval and a Fire Services Agreement' between the Project applicant(s) and the San Diego Rural Fire Protection District (SDRFPD, now SDCFA). The same is true for Alternative H. Further, construction of a permanent fire station would be required in order to meet County's travel time standard from the closest fire station. In response to the commenter's concern over fair share contribution, this would only occur "if SDRFPD [SDCFA] determines that the facility should be expanded to serve other areas." Regarding the commenter's statement regarding operational costs, if the cost of providing fire services on-site exceeds available revenue, the homeowners association will be required to create an ongoing funding mechanism for any costs not covered by tax revenue. The Fiscal Impact Analysis projects the revenue generated by the proposed Project, which is allocated to Fire and Emergency Services. The proposed Project and Alternative H will be required to create a Community Facilities District (CFD) or comparable financing mechanism to fund the difference between the operating expense and revenue for Fire/Emergency Services. The CFD is assessed against the property owners of the project in perpetuity. Any fair share contribution would be determined by an agreement between the County and Project applicants.

RO-4-86 The comment states if costs are not sufficiently covered by the Developer, California and federal residents end up paying through higher insurance premiums and taxes that support Cal Fire and federal government subsidies and grants for homes in high risk areas. This comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-87 The comment states the EIR fails to adequately assess and mitigate cumulative wildfire impacts of the proposed Project. The comment also refers to developments approved by the County in 2018 that were not included in the EIR's cumulative analysis. Cumulative impacts are addressed under the Hazards section in the EIR and in the FPP, Section 10. Impacts on fire service from each project analyzed in the cumulative impacts analysis are mitigated on a project-by-project basis. The FPP does not analyze specific future projects for cumulative impacts but, based on the fact that each project mitigates its potential impact from wildfires through the strict adherence to fire and building codes along with revenues for enhancing fire response resources in the form of fire fees and tax apportionments, concludes that there is no significant cumulative impact.

RO-4-88 The comment states the EIR's analysis of the proposed Project's water supply impacts is inadequate. The comment states the proposed Project's residences would use far more water

than the State average. In response, the commenter does not provide specific examples of why they believe the water supply analysis is inadequate. An Overview of Water Service was prepared for the proposed Project and Alternative H (Appendices C-17 and D-17), Otay Water District (OWD) prepared and approved the Water Supply Assessment and Verification Report (Appendices C-18 and D-18), and water supply was analyzed in the DEIR (2015). This is an appropriate level of analysis of water supply impacts for both the proposed Project and Alternative H. The commenter did not provide quantitative data for their reference to the State average water use, or a reference to a specific source from where they are obtaining this data; therefore, a response cannot be provided to this comment.

RO-4-89 The comment states the DEIR's water supply analysis relies on outdated planning documents. In response, the Final EIR analyzes the impacts of the proposed Project and alternatives to the proposed Project, one of which is Alternative H. The impacts of the proposed Project are analyzed in the DEIR, which was circulated for public review in 2015. The Draft EIR (2015) relies upon information available at the time it was written and is in line with baseline conditions; therefore, revisions are not necessary. Subsequently, Alternative H was identified as an additional alternative and analysis of the impacts of Alternative H is included in Chapter 4 and Appendices D-1 through D-24, which were included in the 2019 Recirculation Package for public review. Potential impacts to regional water supplies for both the proposed Project and Alternative H are adequately disclosed within the Final EIR, which includes the DEIR (2015), its associated appendices, and the 2019 Recirculated Package. The County Board of Supervisors may consider the proposed Project, as described in the 2015 DEIR, Alternative H, or any of the other alternatives include in Chapter 4.0 for approval. The Project Applicant now seeks approval of Alternative H, based on consultation with the Wildlife Agencies.

RO-4-90 The comment states the EIR improperly relies on outdated Urban Water Management Plans (UWMPs). The commenter is referencing information that was not included in the 2019 Recirculation Package and therefore was not eligible for comment during this public review period. The DEIR (2015) was prepared using information available at the time it was written, pursuant with the baseline conditions established by the release of the Notice of Preparation. Therefore, the analysis in the DEIR (2015) does not need to be revised to reflect updated information. However, it has been updated to acknowledge that an updated UWMP has been published.

RO-4-91 The comment states water duty factors used to analyze the proposed Project differ from those used to analyze Alternative H. See Response to Comment RO-4-90.

RO-4-92 The comment states the EIR's analysis of regional water supplies is inadequate. The comment also states general concerns over future conditions in San Diego County. This comment serves as an introduction to comments that follow, which are addressed in the specific Response to Comments RO-4-93 through RO-4-99.

RO-4-93 The comment states the EIR's water supply projections are inconsistent with SDCWA projections. The comment states the EIR's Table 3-1 does not reflect the current SDCWA projections for reliance on MWD water supplies. The comment further states the discrepancy between SDCWA's publicly available data and the data relied on for the proposed Project's

water supply analysis is not explained in the EIR. In response, the commenter is correct that SDCWA intends to reduce their reliance on MWD for their water supplies. While the specific amount of water imported from MWD differs between SDCWA's estimates and the estimates found within Appendix D-18, the overall amount of water provided by SDCWA increases over the years. The exact portfolio of suppliers is left to the discretion of SDCWA and will not impact, or be impacted by, the proposed Project or any of its alternatives.

RO-4-94 The comment states the EIR fails to properly acknowledge or assess the uncertainty of future water supplies. The comment also states the EIR anticipates Project demand outstripping supply as soon as 2025 under single dry water year conditions, but the EIR does not provide further detail about SDCWA's carryover storage programs. In response, the table presented on page 3-7 of Appendix D-18 shows regional water demand, not demand from Alternative H alone. Further, SDCWA is an independent agency that will employ various methods to meet water demands. It is beyond the scope of the DEIR to evaluate potential environmental impacts associated with these actions.

RO-4-95 The comment states the County's conclusion that use of carryover storage will reduce or eliminate the impacts associated with water supply shortages is not supported by substantial evidence. The comment further states the EIR's water supply analysis must explain how (and from what sources) SDCWA will develop and maintain carryover capacity sufficient to alleviate water supply shortages. Please see Response to Comment RO-4-94. It is not within the scope of the DEIR to discuss or address specific actions of the SDCWA. The Water Supply Assessment and Verification Report (Appendix D-18) prepared by the OWD determined that sufficient water supplies are available to meet the projected water demands of Alternative H.

RO-4-96 This comment discusses another agency's document, the 2015 UWMP prepared by the SDCWA. This document is outside of the scope of the 2015 DEIR and 2019 Recirculation. The comment does not raise an issue regarding the adequacy of the environmental analysis in the EIR; therefore, no further response is provided.

RO-4-97 The comment states the EIR does not explain the relationship between the emergency supply and carryover storage. The commenter refers to the Emergency Storage Project, conducted by a separate agency, the SDCWA. It is outside the scope of this project's DEIR to explain how reservoir levels are maintained or affected in drought scenarios, as requested by the commenter.

RO-4-98 The comment states the EIR fails to address the regional water supply ramifications of the Lower Basin Drought Contingency Plan. The comment further discusses information from various MWD references. In response, while the Lower Basin Drought Contingency Plan is important for regional water supplies, it is not within the scope of the DEIR (2015) or Recirculation Package (2019) to discuss management decisions that will be made by the MWD in the event of a drought. Water contributions made by water purveyors during drought conditions are not a part of the proposed Project or any of its alternatives; therefore, they do not need to be addressed in the environmental analysis.

RO-4-99 The comment states the EIR must provide an analysis of how MWD will continue to provide imports to SDCWA, particularly in dry years when its obligations under the Lower Basin

Drought Contingency Plan (LBDCP) would foreseeably be triggered. The comment further states that the EIR and water supply documents referenced in the EIR do not mention the LBDCP. In response, it is not within the purview of this project-specific EIR to analyze how MWD will provide water to SDCWA. The Water Supply Assessment and Verification Report (Appendix D-18) was written by the OWD and states that an adequate water supply can be provided to the proposed Project. It is beyond the scope of this project-level EIR to designate replacement supplies or analyze impacts associated with those replacement supplies, as it is the responsibility of MWD and SDCWA to determine those things.

RO-4-100 The comment states the DEIR does not adequately address the proposed Project's cumulative impacts on water supply. The comment also addresses UWMPs prepared by the SDCWA. In response, the comment does not raise a specific issue regarding why the water supply cumulative impacts analysis is not adequate. The UWMPs are outside of the scope of the response to comments for this EIR. Therefore, no further response is provided.

RO-4-101 The comment states the list of "near-term annexations" fails to include all development projects currently being considered by the County. The comment also states the EIR's failure to account for general plan amendment-related growth renders the cumulative impacts analysis incomplete. The 2015 DEIR and 2019 Recirculation Package rely on best available data, including what is provided by the SDCWA. What is included in the SDCWA demand forecasts is outside of the scope of the response to comments for this EIR. Therefore, no further response is provided.

RO-4-102 The comment states that, in the context of water supply, periodic UWMP updates will always be playing catch up to the demand created by GPA projects approved since the most recent population projections. The comment further states that the UWMP's retroactive accounting for GPA-associated demand undermines evidence in support of the EIR's water supply analysis.

RO-4-103 The comment states that the DEIR fails to properly disclose and analyze the potential impacts of the annexation of the Project site to OWD's service area. The comment refers to inconsistencies in the 2015 DEIR itself and the recirculated documents. In response, the 2015 DEIR references annexation of the proposed Project to SDCWA, MWD, and OWD in several locations throughout Chapter 1.0, and Sections 3.3, and 3.7. At the time the 2015 DEIR was written, it was understood that, should OWD adopt an offset program, the proposed Project would be required to comply with that program. However, an offset program was not adopted by OWD and therefore is not referred to in the Overview of Water Services Supplemental Analysis for Alternative H (Appendix D-17) or in the Water Supply Assessment and Verification Report in the 2019 Recirculation Package (Appendix D-18). As stated in the Water Supply Assessment and Verification Report, water supply needs of the project can be met.

RO-4-104 The comment states that the EIR's inadequate water supply analysis and failure to adequately disclose or consider environmental impacts of supplying water to the proposed Project violated CEQA and water code. As described in Responses to Comments RO-4-88 through RO-4-103 above, the environmental analysis in the 2015 DEIR (Chapter 1.0, and Sections 3.3, and 3.7) and 2019 Recirculation Package (Appendices D-17 and D-18) is adequate to determine water

supply and demand for the proposed Project and its alternatives. The EIR will not be recirculated again.

RO-4-105 The comment provides conclusionary statements. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-106 The comment requests the Center for Biological Diversity be included on the notice list for future project updates and notices. In response, the Center will be notified as requested. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-107 The comment is a letter that was previously submitted during the 2015 public comment period. The letter is responded to in its entirety in Response to Comment O-15. Therefore, no further response is provided here.

RO-4-108 This comment provides a transportation table from another document without any additional detail. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-109 The comment provides Minute orders for the County of San Diego Superior Court. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided here.

RO-4-110 The comment provides a copy of a letter that was also submitted separately as a part of the 2019 Public Review Period. This letter has been responded to in full in Response to Comment RO-5. Therefore, no further response is provided.

RO-4-111 The comment provides a Heat Map labeled Confidential, which was originally produced by the County. However, no comment was provided with the map; therefore, no further response is provided.

RO-4-112 The comment provides a conservation value map with the proposed Project Development Footprint. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-113 The comment provides a letter to the County of San Diego referencing several County of San Diego projects. In response, fire studies, specifically "Fire history of the San Francisco East Bay region and implications for landscape patterns" (Jon E Keeley 2005) actually contradicts the comment's assertion by stating:

> This region has a largely anthropogenic fire regime with no lightning-ignited fires in most years. Fire suppression policy has not excluded fire from this region; however, it has been effective at maintaining roughly similar burning levels in the face of increasing anthropogenic fires, and effective at decreasing the size of fires. Fire frequency parallels increasing population growth until the latter part of the 20th century, when it reached a plateau.

These study findings support other published research indicating that there may be an increase in ignitions with new development, but this condition has a limited life span and the number of ignitions plateaus or declines over time. It also supports research indicating that, even though there may be temporary increases in fire ignitions, the introduction of development, with fire suppression capabilities, like the proposed Project would include, reduces the acres burned from pre-development levels.

Further, the study does not differentiate between new development and its provided fire protection features and the increase in population in the study, which occurred between 1945 and 2002. The majority of the development occurring during the study period would have been vulnerable to wildfires and would not include designated, managed, and maintained fuel modification zones. This study factor is significant since ignition-resistant homes fitted with interior sprinklers reduce the potential for a structure fire and managed landscapes and fuel modification zones provide a buffer that minimizes fire encroachment into a community, but also the potential that fire in the community escapes into adjacent open space.

Land Use Planning and Wildfire: Development Policies Influence Future Probability of Housing Loss. 2013. Alexandra D. Syphard, et al.[10]

The commenter references this study focusing on land use planning relationships to fire risk. The study uses modeling to determine high fire risk areas, determines the likelihood that these areas would develop, and then makes assumptions about homes burning within these areas. The result is a ranking of where it is most likely for homes to be at risk, with leapfrog development considered the highest risk.

The study is based on assumptions that are not consistent with new development in San Diego County and at the proposed Project site. The study does not consider the layered fire protection system that is required for new development in fire hazard severity zones. These requirements for ignition-resistant construction, ingress and egress to code, water availability, fast emergency response, and managed fuel modification zones, among many others, are required because they have been shown to work in minimizing the effects of wildfires on structures. The same type of modeling conducted in this study was conducted by Cal Fire to determine where the high fire risk areas are located. Then, ignition-resistant requirements were codified in the California Building Code mandating that homes built in these fire hazard areas be built to these very restrictive standards that harden the exterior of homes from heat, flame, and embers. San Diego County adopted these standards along with even more stringent requirements, as detailed in the Alternative H Project's FPP (Section 7).

These stringent requirements work. As presented in Section 4 of the FPP, as requirements for building in fire hazard severity zones and wildland urban interface areas have iteratively increased structure and landscape ignition resistance, the number of homes damaged or destroyed has declined significantly.

[10] Syphard, Alexandra D. Avi Bar Massada, Jon E. Keeley. 2013. *Land Use Planning and Wildfire: Development Policies Influence Future Probability of Housing Loss*. August. https://doi.org/10.1371/journal.pone.0071708

The referenced study acknowledges the use of building and community hardening as an alternative, but summarily dismisses this due to the cost of building homes to these high levels of protection:

> One alternative to traditional fire management that is receiving widespread attention is to prepare communities through the use of fire-safe building materials or creating defensible space around structures. These actions represent an important shift in emphasis from trying to prevent wildfires in fire-prone areas to better anticipating fires that are ultimately inevitable. Nevertheless, the cost of building and retrofitting homes to be fire-safe can be prohibitive…."

Further, the study considers its results as one of a range of options, all of which are already employed in San Diego County and for the proposed Project:

> Land use planning is one of a range of options available for reducing fire risk, and the best outcome will likely be achieved through a combination of strategies that include homeowner actions, improvements in fire-safe building codes, and advanced fire suppression tactics.

These options are all employed at the proposed Project site and additional measures are provided that remove important maintenance from the responsibility of the homeowners to a funded HOA that is then monitored by a third party. The fuel modification zones that are customized for this site and the fire threat presented by off-site fuels would be maintained by the HOA and inspected by a third party to certify that it remains functional at all times.

Lastly, the study recognizes that its modeling is very coarse and not directly applicable throughout San Diego County. It defers to local planners to determine where high risk areas are and, presumably, how to proceed in terms of providing restrictions for safe development:

> Nevertheless, because fire risk is highly variable over space and time, and due to a range of human and biophysical variables [60], we recommend planners develop their own models for the best understanding of where the most fire-prone areas are in their region [19]."

Because the study is not directly comparable with the proposed Project, and the findings actually support the planning and protection provided by Alternative H, the comment raises no new issues with the DEIR or its analysis and, therefore, requires no additional response.

The comment also references human-caused ignitions citing this 2007 study that focused on modeling the relationship between human population and fire ignitions and acreage burned. The study's goal was to "determine how humans influence fire in California and to examine whether this influence was linear, by relating contemporary (2000) and historic (1960–2000) fire data to both human and biophysical variables."

The study concludes that there is a relationship between human presence and fire ignitions, and it is supported by other published research, including Cal Fire's fire history data that lists human-caused ignitions as the leading source. It is important to clarify that this study does not conclude

that well-designed, highly ignition-resistant communities are a leading source of ignitions at the wildland urban interface. In fact, the study did not include a component that considered the positive effects that managed landscapes and fuel modification zones along with ignition-resistant structures have on reducing ignitions. Without this comparison, it is difficult to apply this study's results to the proposed Project. Nevertheless, the study found:

> …nonlinear effects such that fire frequency and area burned were highest at intermediate levels of human activity, but declined beyond certain thresholds. Human activities also explained change in fire frequency and area burned (1960–2000), but our models had greater explanatory power during the years 1960–1980, when there was more dramatic change in fire frequency."

This finding seems to indicate that across the study area, there was a marked increase in fire frequency from 1960 to 1980 when populations were rapidly expanding (but fire protection features were not mandatory) and not a strong correlation after 1980, when many jurisdictions began requiring additional measures to protect homes at the WUI, which in turn minimized open space from ignitions within developed areas.

The study suggests that local land planners can utilize findings related to density (high-density development is less prone to fire risk than intermediate levels). This, in fact, has been accounted for at the proposed Project and the majority of the development is high density. Further, the lower-density portions of the proposed Project include HOA-managed fuel modification zones and other restrictions that are consistent with the higher-density areas. This type of development is not accounted for in the study's methodology.

The study also points out that humans not only have a negative or a positive impact on fire occurrence:

> Another explanation for the discrepancy is that relationships between human activities and fire may be nonlinear in that humans may affect fire occurrence positively or negatively, depending on the level of influence. These nonlinear effects were apparent in data from a recent study in the San Francisco Bay region, where population growth was positively related to fire frequency over time up to a point, but then fire frequency leveled off as population continued to increase (Keeley 2005)."

This finding has been reported in other published studies and considers that, as development occurs, flammable vegetation is converted to less flammable, ignition-resistant landscapes, there are more humans present on a daily basis to monitor and discourage would-be arsons, and there are typically fire suppression resources and an increase in accessibility to wildland fuel interface areas. The proposed Project provides all of these benefits.

The study provides additional findings that support the notion that humans' influence on fire risk may be less significant than reported:

> Therefore, human effects on area burned may cancel one another out to some extent because fire suppression can minimize the increase in area burned that would result from increased ignitions, at least at the WUI."

The study indicates that there have been varying impacts of human activities on the change in fires in the study area.

> The second question we asked was 'How do human activities relate to change in fire?' In the last 40 years, the most substantial change was the increase in number of fires from 1960 to 1980. The decrease in number of fires was less dramatic between 1980 and 2000; and the change in area burned was relatively small in both time periods. Housing development patterns were most influential when change was greatest, from 1960 to 1980, and for trends in fire frequency (vs. area burned)."

This statement indicates that the most recent data suggest a decrease in the number of fire starts between 1980 and 2000 and very little change in overall acreage burned. Therefore, despite a documented increase in human-caused fire starts, the number of acres burned has been virtually unaffected. This supports the stance that early fire detection and reporting and fast response from a nearby fire station limits fire spread and minimizes damage to wildland areas while the provided protections at master planned communities minimize risk to persons and their property. As indicated in the study: "…it appears that when human population density and development reach a certain threshold density, ignitions decline, and this is likely the result of diminished and highly fragmented open space with fuels insufficient to sustain fire. In addition, above a certain population threshold, fire suppression resources are likely to be more concentrated in the WUI." This accurately describes the proposed Project and supports the site-wide landscape conversions that avoid co-mingling of unmaintained fuels and provides fire suppression resources within a short timeframe from all proposed Project areas.

Because the study is not directly comparable with the proposed Project, and the findings do not conflict with the planning and protection provided the proposed Project, the comment raises no new issues with the DEIR or its analysis and, therefore, requires no additional response.

RO-4-114 The comment provides a water supply table from a SDCWA document. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-115 The comment provides water levels at reservoirs and lakes from the City of San Diego's website. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-116 The comment provides an excerpt from *On the Winds of Checkerspots: A Model System for Population Biology*. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-117 The comment provides a journal article on general metapopulation models and the core-satellite species hypothesis. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-118 The comment provides a journal article on the Bay checkerspot butterfly. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-119 The comment provides a journal article on the Bay checkerspot butterfly. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-120 The comment provides a journal article on sink populations. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-121 The comment provides a journal article on the Quino checkerspot butterfly. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-122 The comment provides a journal article on rainfall, resources, and dispersal. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-123 The comment provides a journal article on microhabitat conditions. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-124 The comment provides a journal article on the Quino checkerspot butterfly. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-125 The comment provides a journal article on changing distribution patterns. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-126 The comment provides a journal article on the population dynamics of the checkerspot butterfly (*Euphydryas editha*). The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-127 The comment provides the USFWS Recovery Plan for the Quino Checkerspot Butterfly. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-128 The comment provides the USFWS 5-year Review for the Quino Checkerspot Butterfly. The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.

RO-4-129 The comment provides a journal article titled “The Trouble with Butterflies.” The comment does not raise an issue regarding the adequacy of the environmental analysis; therefore, no further response is provided.